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ABSTRACT

Interpretive information about the Texas Career Education Measurement Series (CEMS) is provided in this manual. CEMS consists of a battery of 17 instruments--sixteen category tests and one survey instrument--designed to assess the development of secondary students in terms of career education. The manual is in four parts. Part 1 briefly describes the content of CEMS and the nature of the measurement instruments. Part 2 contains necessary detailed information for school personnel to interpret the results of the tests. Part 3 describes how to use the series of tests which comprise CEMS. Part 4 outlines the basis for development of CEMS and includes a historical summary of the methodologies utilized and the activities involved in constructing the measurement system. Two appendixes are included: Appendix A is a complete list of the categories, sub-categories, outcome based objectives, test booklets, and items which constitute the foundation of CEMS; and Appendix B lists the addresses of all regional education service centers. (TA)

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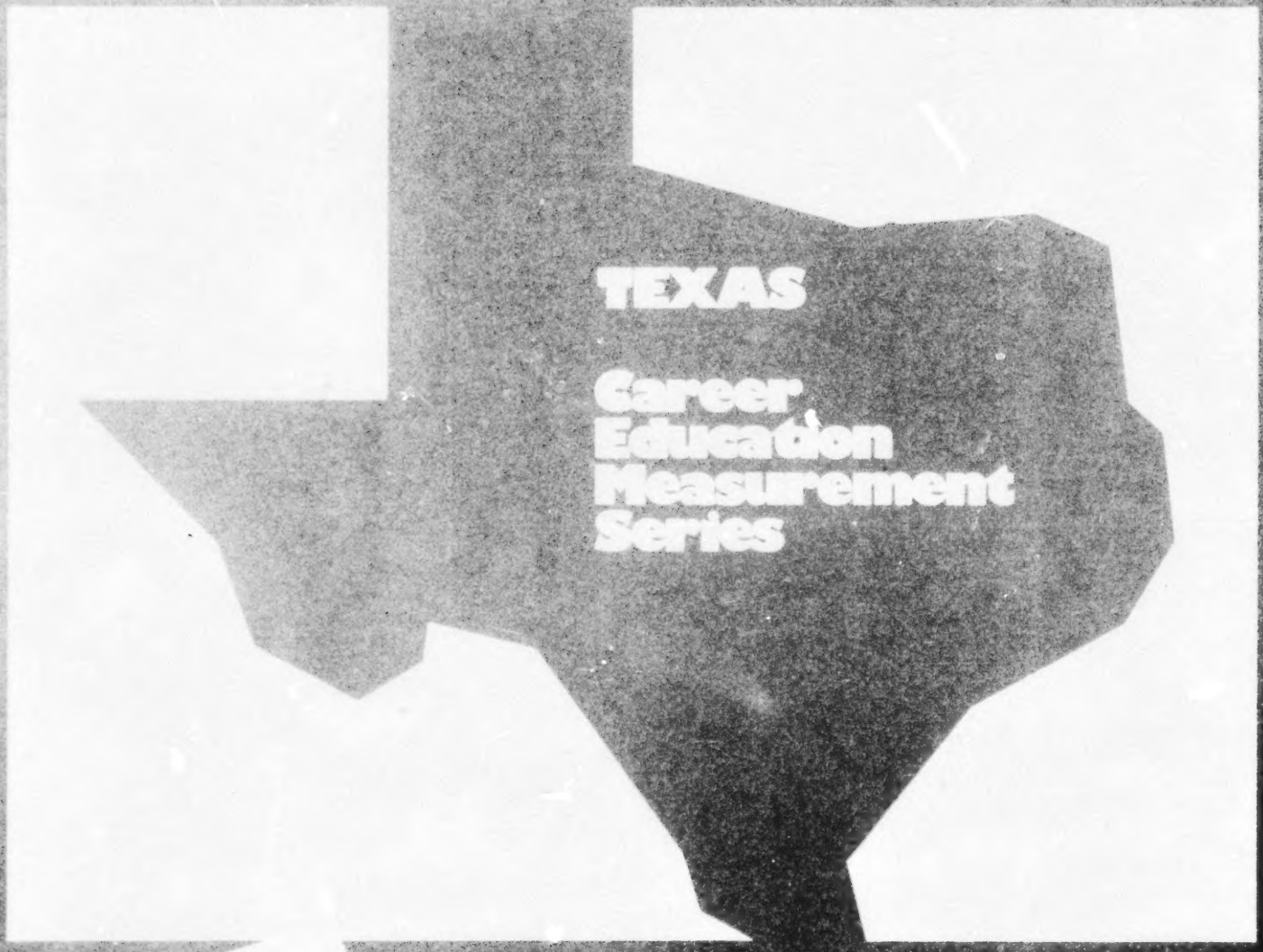
USER'S GUIDE



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Texas Education Agency
Austin, Texas

F O R E W O R D

The Texas Career Education Measurement Series (CEMS) has been developed through the cooperative efforts of the Texas Education Agency; the Measurement Research Center of the Westinghouse Learning Corporation; and the Partners in Career Education Project, sponsored by the Dallas and Fort Worth Independent School Districts and Education Service Center Regions X and XI. Guidance and direction have been provided throughout the two and one-half year developmental period by the Assessment of Career Education Steering Committee and the Division of Program Planning and Needs Assessment of the Texas Education Agency.

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INTRODUCTION

This manual will provide interpretive information about the Texas Career Education Measurement Series (CEMS). CEMS consists of a battery of seventeen instruments--sixteen category tests and one survey instrument--designed to assess the development of secondary students in terms of career education.

The manual is in four parts. Part I gives a brief description of the content of CEMS and the nature of the measurement instruments. Part II contains the necessary detailed information for school personnel to interpret the results of the tests. Part III describes how to use the series of tests which comprise CEMS. Part IV outlines the basis for development of CEMS and includes a historical summary of the methodologies utilized and the activities involved in constructing the measurement system.

The manual also contains two appendices. Appendix A is a complete list of the categories, sub-categories, outcome based objectives*, test booklets, and items which constitute the foundation of CEMS. Appendix B provides the addresses of all regional education service centers for school personnel desiring additional information about CEMS.

*These objectives are revised statements of the Basic Learner Outcomes for Career Education (TEA, Austin, Texas, 1973).

PART I

DESCRIPTION OF CEMS

Nature of the Instruments

CEMS consists of seventeen instruments--a survey test and sixteen category tests. These instruments are designed to be "criterion-referenced" or "objective-based" to permit better diagnostic information for the student and teacher. This type of measurement is used to evaluate a student's performance in terms of objective statements or learner outcomes. It is not a method for comparing students with each other.

Relationship of CEMS Components

The organizational framework on which the CEMS instruments were developed and items were distributed is as follows:

CATEGORY--A broad topic or theme in Career Education (CEMS contains nine categories).

SUB-CATEGORY--More explicit definition of the category (CEMS contains 26 sub-categories).

OUTCOME--Objective statement of student behavior (CEMS contains 63 outcomes).

Figure 1 on page 5 shows the relationship between the categories, sub-categories and outcomes.

The Survey Test

The survey test is useful for general assessment of student development and for identification of areas where further testing may be appropriate. It was developed to indicate student strengths and weaknesses in relation to the various categories and sub-categories as measured by the sixteen category tests. The items found to be the most appropriate (representative) from each sub-category were selected to provide indicators of probable student performance on the outcomes contained within a particular sub-category. Forty-five items were selected for the survey instrument to represent the 26 sub-categories into which the nine general categories are divided.

The Category Tests

The sixteen category tests are intended to provide diagnostic information regarding student development in terms of the behavior described by the basic learner outcomes. The arrangement of items within a category instrument was determined by the content, difficulty, specificity, and length of each item. Also considered was the relationship of items within a set or group which measured a sub-category, the stimulus for each item, and the response patterns of linked items.

CATEGORY	SUB-CATEGORY	OUTCOME BASED OBJECTIVE
Career Planning and Decision Making	Goal Setting	The student should be able to determine the importance of matching his personal goals with his career choice
		The student should be able to identify factors that contribute to personal job satisfaction.
	Lifestyle	The student should be able to identify factors which influence a person's lifestyle.
	Assistance in Decision Making	The student should be able to apply a decision-making process to solving problems related to career choice.
		The student should be able to use his/her own resourcefulness to solve career-related problems.

Figure 1: Relationship of CEMS Components

PART II

HOW TO INTERPRET THE RESULTS

Survey Test Report

The survey test report is shown in Figure 2 on page 9. This report will provide (1) information regarding the status of each student in relation to the sub-categories, (2) the appropriate category test which can be used for further diagnosing strengths and weaknesses in a particular sub-category and, (3) the percentage of students in a classroom that demonstrated proficiency in each sub-category.

As an example, examine the status of a classroom of students in relation to the survey test by referring to the survey test report in Figure 2 and to Appendix A for a complete list of categories, sub-categories, outcomes, test booklets and items. Below is a key to the various components of the survey test report. The numbers below correspond to the circled numbers on the form in Figure 2. Those components that are blocked in are of particular importance to the teacher.

1. A processing number used for collating reports by classroom and school. This number is not meaningful to the teacher.

2. The school code number which identifies the region, county, school district, and campus.

3. The title of the assessment: "Texas Career Education".

4. The name of the school receiving the report.

5. The page number depicting that a report is over one page wide.

6. The date the report was printed.

7. The name of the teacher receiving the report.

8. The grade level of students taking the test.

[9] The form number indicates the particular test booklet. The survey test will always have a form number of "00".

[10]. The category test booklet numbers are read horizontally (e.g., 01-01 depicts Category 1, Booklet 1). These are the appropriate category tests that may be given to confirm a student's strengths or weaknesses in a particular sub-category.

[11]. The sub-categories are read vertically. For example, in category 1-1 the sub-categories measured by the survey test are 001 and 002.

[12]. This shows the status of each student in relation to the sub-categories. A "-" below a sub-category indicates a possible weakness in that sub-category. This diagnosis could be confirmed by administering the appropriate category test or the specific items in the category test that relate to that sub-category. (This information is found in Appendix A.)

EXAMPLE: John Jones demonstrates a lack of proficiency in sub-categories 002, 004, 005, 008, 009, and 010. It would then be appropriate to administer to John, Category Test 1-1, 2-1, 3-1, and 4-1. The teacher may decide to give John the entire category test or may elect to give only those items that relate to each sub-category in which John demonstrated a weakness.

[13]. A sub-category percent for each student shows the percentage of sub-categories in which the student got all items correct. (There is a total of 26 sub-categories.)

EXAMPLE: John Jones answered all items correctly in 47% of the sub-categories.

[14]. The category percent for each student shows the percentage of categories in which the student got all items correct. (There is a total of 16 category booklets.)

EXAMPLE: John Jones answered all items correctly in 50% of the category booklets.

15. The number of students that took the test.

16. Sub-category percents are read vertically. This number indicates the percentage of students in the classroom that correctly answered all items in a particular sub-category.

EXAMPLE: 25% of the students in the classroom correctly answered all items in sub-category 001. Also, this indicates that 75% of the students in the classroom did not answer all items correctly in this sub-category. The teacher would then check the report to identify these students, and would administer to them Category Test 1-1 or may decide to select only those items in the category test that relate to sub-category 001.

17. Category percents are read horizontally. This number indicates the percentage of students in the classroom that answered all items correctly in a particular category.

EXAMPLE: 42% of the students in the classroom correctly answered all items in Category 1-1.

① 0028-002-001 ② SCHOOL CODE-20190912003
③ TEXAS CAREER ED
④ ROOSEVELT
TEACHER CLASS SUMMARY ⑦ MRS. JOE ADAMS ⑧ GD-09
⑤ PAGE-001-A ⑥ DATE-09/01/75 ⑨ FORM-000

⑩ CATEGORY TEST-	01-01	01-02	02-01	03-01	04-01	STUDENT SUMMARY	
⑪ SUB-CATEGORY-	00	0	0000	00	0		
	00	0	0000	00	1		
STUDENT	12	3	4567	89	0	⑬ SUB CATG PERCENT	⑭ CATG. PERCENT
JONES JOHN J	⑫ -		--	--	-	47	50
KLEMPHIMER JANICE A	-	-	- --	--	-	.26	20
MEMMBLER ED	--		-	-		73	78
OPHEIMMER MELVIN T		-	-			67	72
RANDALL GEORGE	--			-		67	64
STRAVERS MARY J	-		- -	-	-		
TRACHSEL BENNY	-		--	-	-	60	57
VANDERLOEGH TIM S	--		- -	-	-	53	46
						40	41

PERCENT OF STUDENTS MASTERING OBJECTIVES (STUDENT N-COUNT = 8) ⑮

SUB CATG. PERCENT (TENS)	⑯ 25	7	2676	17	6
(UNITS)	50	5	5353	35	3
CATG. PERCENT	⑰ 42	75	56	38	67

CATEGORY TESTS ARE READ HORIZONTALLY; SUB CATEGORIES ARE READ VERTICALLY
BLANK INDICATES STRENGTH; - INDICATES WEAKNESS

FIGURE 2: SURVEY TEST REPORT

Category Test Report

A category test report is shown in Figure 3 on page 12. This report will provide information regarding the status of each student in relation to the outcomes and the percentage of students in the class that demonstrated mastery of each outcome.

As an example, examine the status of a classroom of students in relation to a category test by referring to the category test report in Figure 3 and to Appendix A for a complete list of categories, sub-categories, outcomes, test booklets, and items. Below is a key to the various components of the category test report. The numbers below correspond to the circled numbers on the form in Figure 3. Those components that are blocked in are of particular importance to the teacher.

1. A processing number used for collating reports by classroom and school. This number is not meaningful to the teacher.

2. The school code number which identifies the region, county, school district, and campus.

3. The title of the assessment: "Texas Career Education".

4. The name of the school receiving the report.

5. The page number depicting that a report is over one page wide.

6. The date the report was printed.

7. The name of the teacher receiving the report.

8. The grade level of students taking the test.

9. The form number indicates the particular category test booklet. For example, the Form Number "11" indicates Category 1, Booklet 1.

10. The sub-category numbers are read horizontally, (e.g., 00-01 depicts sub-category 001). These are the sub-categories contained in a particular category test.

EXAMPLE: In Category 1-1, there are two sub-categories, 001 and 002.

11. The outcomes are read vertically. For example, the outcomes 103 and 104 are contained in sub-category 001.

12. This shows the status of each student in relation to the outcomes. A blank indicates mastery of the outcome; a "-" indicates non-mastery of the outcome.

EXAMPLE: The results from Category Test 1-1 show that John Jones has mastered outcome 104, but has not mastered outcomes 103 and 112. This would indicate that instruction toward outcomes 103 and 112 needs to be provided for John Jones.

13. The outcome percent for each student shows the percentage of outcomes in the category mastered by the student.

EXAMPLE: John Jones mastered 56% of the outcomes in this category test booklet.

14. The sub-category percent for each student shows the percentage of sub-categories in which the student mastered all outcomes.

EXAMPLE: John Jones mastered all the outcomes in 60% percent of the sub-categories.

15. The number of students that took the test.

16. Outcome percents are read vertically. This number indicates the percentage of students in the classroom that mastered a particular outcome.

EXAMPLE: 50% of the students in the classroom mastered outcome 103. This also indicates that 50% of the students in the classroom did not master this outcome and, therefore, instruction toward this outcome should be provided for these students.

17. Sub-category percents are read horizontally. This number indicates the percentage of students in the classroom that mastered all outcomes in a particular sub-category.

EXAMPLE: 46% of the students in the classroom mastered all of the outcomes in sub-category 001.

① 0005-001-002 ② SCHOOL CODE- 20190912003
③ TEXAS CAREER ED
④ ROOSEVELT ⑦ MRS. JOE ADAMS ⑧ GD-06
TEACHER CLASS SUMMARY
⑤ PAGE-001-A ⑥ DATE-10/01/75 ⑨ FORM-II

			⑩ SUB-CATG.-	00-01	00-02	STUDENT SUMMARY	
			⑪ OUTCOME-	11	1	⑬ OUTCOME PERCENT	⑭ SUB-CATG. PERCENT
				00	1		
STUDENT				34	2		
JONES	JOHN	T	⑫	-	-	56	60
KLIMPHIMER	JANICE	A		-	-	50	40
MEMMBI	ED			-		56	60
OPHEIMER	MELVIN	T			-	75	80
RANDALL	GEORGE				-	75	80
STRAVERS	MARY	J		-		63	60
TRACHSEL	BENNY			-	-	69	60
VANDERLOEGH	TIM	S		--	-	25	20

14 12

PERCENT OF STUDENTS MASTERING OBJECTIVES (STUDENT N-COUNT = 8) ⑮

OUTCOME PERCENT (TENS)	⑯	56	7
(UNITS)		03	5
SUB-CATG. PERCENT	⑰	46	53

SUB-CATEGORIES ARE READ HORIZONTALLY; OUTCOMES ARE READ VERTICALLY
BLANK INDICATES MASTERY; - INDICATES NON-MASTERY

FIGURE 3: CATEGORY TEST REPORT

PART III

HOW TO USE CEMS

Using the Survey Test

The survey test has two uses. As an assessment instrument, it is designed to provide information regarding the development of students in terms of career education from a broad, general perspective. The results may be useful at the classroom, school, district, or state level. In addition to providing information concerning the students' overall strengths and weaknesses, the survey test is also useful for identifying a career education category (or categories) where administration of one or more of the category tests may be appropriate. It is important to understand that if the survey test is to be utilized, it should be administered prior to the administration of any of the category tests.

Using the Category Tests

The sixteen category tests are intended for use in diagnosing student deficiencies with a higher degree of specificity than by use of the survey test alone (e.g., by sub-category and by basic learner outcomes). The decision to use part or all of a category test may be based upon student performance or teacher discretion.

Using the System

Designed to be diagnostic and prescriptive in nature, CEMS can be effective in implementing an instructional system in career education. The measurement instruments can be used for diagnosis before instruction and for evaluation following instruction. The survey test serves as an indicator of possible areas of strengths and weaknesses in each category. After these areas of concern have been identified, the category tests can then be used to confirm this diagnosis. The teacher may elect to use the entire category test or may select only those items that relate to a particular sub-category in which a weakness exists. The category tests can also be used as a pre-test prior to instruction to assess the student's awareness and knowledge in outcomes of a particular category. Following instruction, the category test can be administered again to evaluate the student's progress toward the mastery of the outcomes. Figure 4 on page 15 illustrates the sequence of using CEMS.

As further illustration of how the system is designed to be used, an example follows:

> *The survey test is administered to a class of ninth graders. The results indicate that a deficiency exists with regard to Career Information on the part of 75%*

of the students. Administration of Category Test 2-1 would then be appropriate. This test would reveal whether students have mastered the learner outcomes in this category and would further indicate areas in which instruction for students should be provided.

It should be emphasized that CEMS, as a complete measurement system, has not yet reached the final stage of development. Further refinement of the instruments and the addition of a prescriptive element to CEMS are forthcoming. It is hoped that the instruments developed thus far will serve as the framework for an efficient measurement system to facilitate the implementation of career education in Texas schools.

For further information regarding the availability of the CEMS measurement instruments, answer keys, or related materials, contact the regional education service center. A list of service centers and addresses is provided in Appendix B.

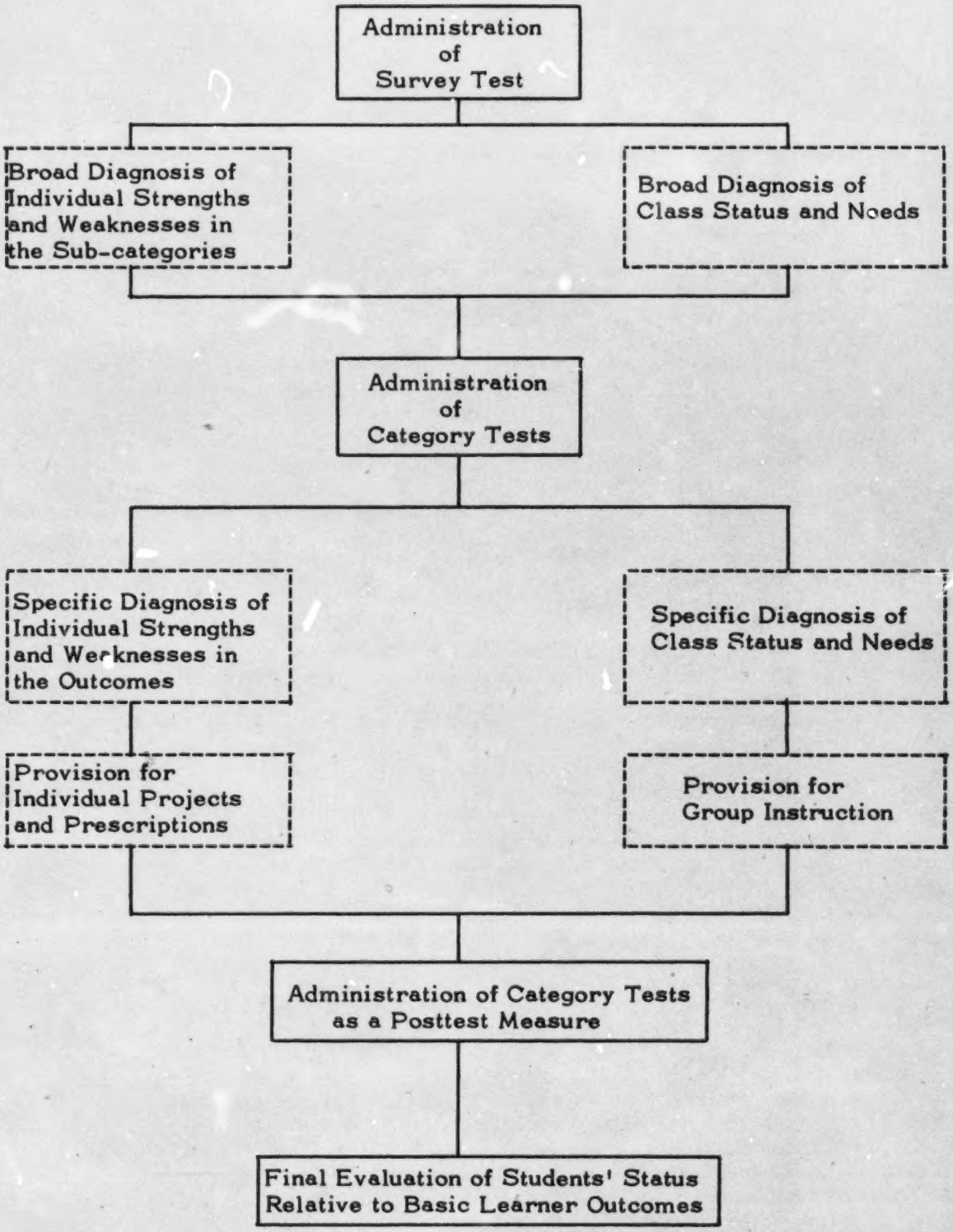
Administration of Survey Test
Broad Diagnosis of Individual Strengths and Weaknesses in the Sub-categories
Broad Diagnosis of Class Status and Needs
Administration of Category Tests
Specific Diagnosis of Individual Strengths and Werknesses in the Outcomes
Specific Diagnosis of Class Status and Needs
Provision for Individual Projects and Prescriptions
Provision for Group Instruction
Administration of Category Tests as a Posttest Measure
Final Evaluation of Students' Status Relative to Basic Learner Outcomes

Figure 4: A Suggested Sequence for Using the CEMS

PART IV

DEVELOPMENT OF CEMS

Initial Developmental Actions

In 1972 the Texas State Board of Education identified career education as one of several top priorities for development. To initiate activities in this priority area a statewide survey was conducted by the Partners in Career Education Project (PARTNERS) and the Division of Program Planning and Needs Assessment of the Texas Education Agency (TEA) to find out what the citizens of Texas believed that student development should be in terms of career education. The specific research question considered for the survey was to discern the skills, capabilities, knowledge, attitudes, or other characteristics considered basic requirements for 17-year-old Texas students. A listing of 279 possible student outcomes was prepared for the survey based upon the following:

- an extensive review of all available career education literature
- visits and consultations with career education practitioners both in Texas and in other states
- the products generated during a series of more than thirty work-group conferences with students, educators, parents, and representatives of the business and industrial communities

More than 6,000 individuals (parents, students, educators, and representatives of business and industry) from every region of the state reviewed the listing and rated the outcomes as either "basic," "desirable," or "inappropriate" for Texas students. Of the 279 outcomes utilized for the survey, 177 were rated as "basic," and 102 as "desirable." None were rated as "inappropriate" for Texas students. Following the survey, the 177 validated basic outcomes were organized into nine career education categories and published by TEA as Basic Learner Outcomes for Career Education (Austin, Texas, 1973). The Texas Education Agency described, in detail, the requirements of a career education measurement system for Texas. A request-for-proposal was then distributed to test development organizations in the fall of 1973. The measurement system described was to contain test items designed to measure student development in terms of the basic learner outcomes. In January of 1974, a contract was negotiated with the Westinghouse Learning Corporation/Measurement Research Center (WLC/MRC) for the development of a criterion-referenced measurement and diagnostic system for career education.

Item Development and Review

Prior to commencing test development, the 177 basic learner outcomes were reduced to 79 through a series of review and evaluation activities. WLC/MRC developed test items for the measurement of these 79 outcomes.

To facilitate the development of test items, WLC/MRC defined the 79 learner outcomes in behavioral terms with 220 objectives. Item development activities were then conducted in two stages. In the first stage groups of Texas educators, consisting primarily of counselors and career education specialists, were brought together in four regional education service centers. These groups were assembled for the purpose of obtaining the ideas of individuals, currently and actively involved with students in the public schools, regarding measurement of the basic learner outcomes. Items and item ideas generated in this fashion were provided to WLC/MRC for refinement and editing. The second stage of the initial item development effort involved the creation of approximately 500 test items by the WLC/MRC professional staff. Stringent review sessions were conducted which involved Texas educators across the state. Panels of students were also encouraged to state their opinions freely about the intelligibility, appropriateness for various grade levels, and the relevancy of the test items. Additional reviews of the items and objectives were conducted by PARTNERS and TEA personnel and by consulting career education professionals. Items were then edited, revised, or deleted according to the composite recommendations of the reviewing groups.

Item Tryouts and Analyses

Items found to be acceptable were prepared in package form for tryouts with a broad sampling of Texas students. The tryout samples were carefully selected to include students from all geographic areas of the state. All substantial minorities within the state and all sizes of schools were represented. Test items utilized in tryouts were administered to more than 3300 eighth and eleventh grade students.

Another aspect of the tryouts involved the selection of 44 basic learner outcomes, elements (objectives) of which were used in a sensitivity-to-instruction study. The students involved in this study were pre-tested, given instruction toward the particular objectives selected, and then post-tested utilizing the WLC/MRC developed test items. Approximately 3000 students in grades seven through twelve were involved. A group of students who had not received instruction toward the objectives was used for comparison purposes. WLC/MRC statisticians conducted tests of statistical significance for the observed differences in the proportion of "gainers" (those who failed the pre-test and passed the post-test) between the experimental and comparison groups.

Analyses of the data accumulated during the item tryouts focused on three major concerns: (1) the relative difficulty of the items as measured by p-values and significance tests for chance performance (student guessing); (2) statistics measuring deviation from a uniform foil response distribution; and (3) variation of p-values and foil response distributions across ethnic groups (blacks, Mexican-Americans, and "others"). In addition, a regression technique was developed by WLC/MRC and TEA statisticians for a statistical determination of the appropriate grade level for the items tried out for each outcome.* Extended review sessions, during which all available data were examined, were conducted. Participating in these sessions were members of PARTNERS, TEA (including the Assessment of Career Education Steering Committee), and WLC/MRC. A substantial number of the items tried out were dropped, some were passed as tried out, and some were passed subject to editing and/or revision. An item refinement process, involving representatives of the three organizations concerned, followed and extended over a period of approximately 45 days.

Field Testing

An extensive field testing of the refined test items was conducted. Twenty-two instruments utilizing 382 items for the measurement of 200 objectives were designed. A sample of 16,000 Texas students was selected from grades 7, 8, 10, and 11. Statisticians from WLC/MRC, working in consultation with TEA, designed the sampling procedures and drew the sample of schools. Analyses of the statistical data and application of the best judgments of the participating professionals resulted in the identification of 273 test items which were considered to be suitable for use in the Texas Career Education Measurement Series (CEMS). These items were organzied into sixteen category instruments for the measurement of 63 basic learner outcomes.(Sixteen of the original 79 outcomes were found to be inadequately measured and are not included in the measurement system at this time).

Utilizing various statistical procedures and subjective judgment, a team of TEA professionals selected test items considered to be the most representative measures of each of 26 sub-categories into which the nine general career education categories are divided. Forty-five test items were selected in this manner for use in a survey test.

*The Development Report on the Texas Career Education Measurement Series, which describes in detail the statistical procedures utilized, is available through the region education service centers or the Division of Program Planning and Needs Assessment, Texas Education Agency.

Extensive testing of the total measurement system is scheduled during the 1975-1976 school year. Data accumulated from this assessment will be used for further refinement of the instruments and the development of simplified procedures for processing, reporting, and interpreting test results. In addition, administration of the various instruments in their current status is expected to provide educators with valuable assessment information regarding the career education development of Texas students.

APPENDIX A

COMPONENTS OF CEMS

CATEGORY 1: Career Planning and Decision Making

	Test Item Numbers	Sub-Category Number & Title	Outcome Number and Outcome Based Objective
TEST BOOKLET 1-1	1-6 12,13	001 Goal Setting	1:03 The student should be able to identify factors that contribute to personal job satisfaction. 1:04 The student should be able to determine the importance of matching personal goals with a career choice.
	7-11	002 Lifestyle	1:12 The student should be able to identify factors which influence a person's lifestyle.
TEST BOOKLET 1-2	1-15	003 Assistance in Decision Making	1:02 The student should be able to apply a decision-making process to solving problems related to career choice. 1:07 The student should be able to use his/her own resourcefulness to solve career-related problems.

CATEGORY 2: Career and Occupational Information

	Test Item Numbers	Sub-Category Number & Title	Outcome Number and Outcome Based Objective
TEST BOOKLET 2-1	1-8	004 Occupational Supply and Demand	2:02 The student should be able to investigate the supply and demand for a particular occupation prior to making a career choice.
	9-14	005 Career Information	2:01 The student should be able to identify the benefits derived from talking with qualified people working in areas of interest to him/her. 2:05 The student should be able to locate and use appropriate sources of information that will aid a person in making a career choice.
	15-19	006 Job Characteristics	2:10 The student should be able to identify various jobs that require the same skills.
	20-22	007 Job Characteristics and Individual Needs and Interests	2:07 The student should be able to match his/her individual needs and interests with his/her career choice.

CATEGORY 3: Job Acquisition and Retention Skills

	Test Item Numbers	Sub-Category Number & Title	Outcome Number and Outcome Based Objective
TEST BOOKLET 3-1	1-8	008 Job Location and Interview Skills	3:01 The student should be able to identify the various parts of a job application form and select from several samples the one form which has been properly completed. 3:02 The student should be able to distinguish between appropriate and inappropriate interview behaviors.
	9-15	009 Job Retention Skills and Understandings	3:07 The student should be able to give examples of ways to improve one's chances for personal job success.

CATEGORY 4: Attitudes and Appreciation for Career Success

	Test Item Numbers	Sub-Category Number & Title	Outcome Number and Outcome Based Objective
TEST BOOKLET 4-1	1-16	010 Attitudes Toward Work	4:03 The student should be able to give examples of individual attitudes toward work and identify factors that influence a person's attitude toward work. 4:05 The student should be able to indicate the advantages of completing a task. 4:07 The student should be able to identify examples of personal satisfaction through one's own accomplishments and recognize that satisfaction may or may not be the same for all individuals. 4:21 The student should be able to demonstrate, as an employee, compliance with reasonable decisions made by other persons with legitimate authority.
TEST BOOKLET 4-2	1-9	011 Appreciation for Quality Work	4:01 The student should be able to detect quality work in relation to a task or job and indicate the advantages of quality work performance. 4:08 The student should be able to give examples of an individual taking pride in his/her work and work products.

CATEGORY 5: Skills in Human Relationships for Careers

	Test Item Numbers	Sub-Category Number & Title	Outcome Number and Outcome Based Objective
TEST BOOKLET 5-1	1-12	012 Interpersonal Relationships Skills	5:06 The student should be able to identify examples of a person exhibiting "good" manners on the job or in social settings and indicate the importance of doing so. 5:16 The student should be able to indicate the benefits of and necessity for being sensitive toward others. 5:18 The student should be able to recognize instances in his/her life when he/she will have to make compromises.
	13-22	013 Human Relationships Skills	5:10 The student should be able to recognize the consequences of prejudice among different races or ethnic groups as it affects tne behavior of individuals. 5:11 The student should be able to identify factors which contribute to prejudice.
TEST BOOKLET 5-2	1-22	014 Group Dynamics Skills	5:04 The student should be able to identify ways a person can effectively interact with other people as a team member. 5:09 The student should be able to identify examples of respectful behavior among people of different races or ethnic origins and indicate the results of such behavior. 5:12 The student should be able to identify the advantages and disadvantages of being a leader and/or follower. 5:22 The student should be able to identify the most effective means of communication for different situations. 5:24 The student should be able to indicate the benefits of communicating, projecting thoughts, and/or expressing one's feelings.

CATEGORY 6: Self-Investigation and Evaluation for Career Success

	Test Item Numbers	Sub-Category Number & Title	Outcome Number and Outcome Based Objective
TEST BOOKLET 6-1	1-7	015 Personal Adjustment and Problem Solving	6:01 The student should be aware of and should be able to select the appropriate assistance from school, public, and/or private counselors on problems about school, home, career choice, career requirements, lifestyles and/or getting along with other people. 6:16 The student should be able to indicate situations in which a person might be required to make adjustments.
	8-13	016 Understanding Self-Concept	6:05 The student should be able to determine the importance of recognizing personal faults or limitations. 6:10 The student should be able to recognize ways a person's self-concept influences his/her ability to succeed.
	14-16	017 Career Interests and Capabilities	6:04 The student should be able to identify factors which will influence a person's career options such as personal characteristics, training requirements, finances, and parental attitudes.

CATEGORY 7: Personal/Work/Societal Responsibilities

	Test Item Numbers	Sub-Category Number & Title	Outcome Number and Outcome Based Objective
TEST BOOKLET 7-1	1-20	018 Responsibilities Within the Work Environment	7:02 The student should be able to identify appropriate behavior for working with or without supervision and for working independently or with others. 7:11 The student should be able to identify responsibilities which one would have to oneself and to fellow workers when performing a task or job. 7:20 The student should be able to identify good safety habits which would be applicable on the job and at home. 7:21 The student should be able to indicate the benefits of caring for and conserving the use of equipment and materials on the job. 7:23 The student should be able to indicate reasons for maintaining good health in relation to job performance.
TEST BOOKLET 7-2	1-19	019 Responsibilities and Rights Derived from Political/Societal Environment	7:04 The student should be able to identify the consequences of a person not working. 7:05 The student should be able to identify rights that are granted to us by our social and political institutions including matters such as property ownership and freedom of speech. 7:07 The student should be able to identify ways our society is responsible for supporting certain individuals such as orphans and the aged. 7:08 The student should be able to identify services such as education, police protection, and highway maintenance that are provided by city, county, state and/or federal governments and paid for with tax money.
TEST BOOKLET 7-3	1-12	020 Developing Positive Attitudes and Behaviors for Participation in the Political/Societal Environment	7:13 The student should be able to indicate situations which reflect a positive attitude or respect toward the United States and participation in the American political and economic systems. 7:16 The student should be able to conclude that participation in the political process can make the system more responsive to its populace. 7:22 The student should be able to identify ways to conserve and reasons for conserving environmental and human resources.

CATEGORY 8: Economic Factors Influencing Career Opportunity

	Test Item Numbers	Sub-Category Number & Title	Outcome Number and Outcome Based Objective
TEST BOOKLET 8-1	1-8	021 Effects of Technology	8:02 The student should be able to identify ways technology can affect a person's work and lifestyle. 8:04 The student should be able to identify situations in which technology necessitates retraining of the labor force.
	9-15	022 Job Specialization and Worker Interdependence	8:31 The student should be able to identify the results of dependence on other people, businesses and communities for our basic needs.
TEST BOOKLET 8-2	1-18	023 Use of Money and Resources	8:08 The student should be able to define interest and indicate why it is a necessary charge for using other people's money. 8:10 The student should be able to determine that the wages a person receives may be dependent upon one's time and effort. 8:11 The student should be able to distinguish between gross income, net income, and income taxes. 8:20 The student should be able to recognize that some decisions a person makes may require giving up doing or buying something else with one's time or money. 8:21 The student should be able to interpret a household budget involving income and expenditures.
TEST BOOKLET 8-3	1-21	024 Supply and Demand	8:16 The student should be able to indicate the relationship among resources, goods and services. 8:17 The student should be able to identify factors that affect the supply and demand of items or services. 8:26 The student should be able to indicate the effects of scarcity of resources. 8:27 The student should be able to identify the effects of consumer influence on the kinds and numbers of goods and services that are produced.

CATEGORY 9: Education/Career Opportunity Relationships

	Test Item Numbers	Sub-Category Number & Title	Outcome Number and Outcome Based Objective
TEST BOOKLET 9-1	1-8	025 Relationships of Education (formal or informal) to Career Opportunity	9:01 The student should be able to give examples of how the understandings of specific knowledge is a means of achieving a particular career goal. 9:04 The student should be able to identify courses which are available in school that offer specialized training programs for full-time employment.
	9-18	026 Relationships of Learning Experiences (in school or out) to Career Opportunity	9:02 The student should be able to identify learning experiences in school which will improve his/her ability to follow a particular career direction or enable him/her to make necessary career adjustments. 9:09 The student should be able to indicate reasons for asking questions when he/she needs information. 9:15 The student should be able to determine that by listening and reading a person can be exposed to and/or absorb the thoughts and knowledge of others.

APPENDIX B: REGIONAL EDUCATION SERVICE CENTERS

Region I Education Service Center
1900 West Schunior
Edinburg, Texas 78539
Telephone: (512) 383-5611

Region II Education Service Center
109 North Chaparral
Corpus Christi, Texas 78401
Telephone: (512) 883-9288

Region III Education Service Center
2710 Hospital Drive
Victoria, Texas 77901
Telephone: (512) 575-0403

Region IV Education Service Center
P. O. Box 863
Houston, Texas 77001
Telephone: (713) 868-1051

Region V Education Service Center
P. O. Box 3546
Beaumont, Texas 77704
Telephone: (713) 892-9562

Region VI Education Service Center
P. O. Box 2201, Sam Houston Station
Huntsville, Texas 77341
Telephone: (713) 295-9161

Region VII Education Service Center
P. O. Drawer 1622
Kilgore, Texas 75662
Telephone: (214) 984-3071

Region VIII Education Service Center
100 North Riddle Street
Mt. Pleasant, Texas 75455
Telephone: (214) 572-6676

Region IX Education Service Center
P. O. Box 4086
Wichita Falls, Texas 76309
Telephone: (817) 322-6928

Region X Education Service Center
P. O. Box 1300
Richardson, Texas 75080
Telephone: (214) 231-6301

Region XI Education Service Center
2821 Cullen Street
Fort Worth, Texas 76107
Telephone: (817) 335-2441

Region XII Education Service Center
P. O. Box 1249
Waco, Texas 76703
Telephone: (817) 756-7494

Region XIII Education Service Center
6504 Tracor Lane
Austin, Texas 78721
Telephone: (512) 926-8080

Region XIV Education Service Center
P. O. Box 3258
Abilene, Texas 79604
Telephone: (915) 677-2911

Region XV Education Service Center
P. O. Box 5199
San Angelo, Texas 76901
Telephone: (915) 655-6551

Region XVI Education Service Center
1601 South Cleveland
Amarillo, Texas 79102
Telephone: (806) 376-5521

Region XVII Education Service Center
700 Texas Commerce Bank Building
Lubbock, Texas 79401
Telephone: (806) 763-4127

Region XVIII Education Service Center
P. O. Box 6020
Midland, Texas 79701
Telephone: (915) 563-2380

Region XIX Education Service Center
P. O. Box 10716
El Paso, Texas 79997
Telephone: (915) 779-3737

Region XX Education Service Center
1550 N. E. Loop 410
San Antonio, Texas 78209
Telephone: (512) 828-3551

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